

**Abstract**

A system and method for displaying graphical information indicative of a plurality of material characteristics for a portion of a part under test. Energy is directed at the selected portion of the part under test. Resultant energy is detected from the selected portion of the part under test and data representative of each of a plurality of material characteristics for the portion of the part under test is obtained based, at least in part, upon the detected energy. A plurality of graphs is formed based upon the obtained data. Each of the graphs has information indicative of a separate one of the plurality of material characteristics. The plurality of graphs is displayed discrete from each other in a manner that facilitates substantially simultaneous visual comparisons between the information contained in each of the plurality of graphs.